Defoliating Forest Insect Impacting Fir Trees in North Cheyenne Cañon

Colorado Springs – White fir and Douglas-fir trees in North Cheyenne Cañon west of Colorado Springs are currently experiencing defoliation from the Douglas-fir tussock moth and western spruce budworm. Damage caused by these pests can be severe following repeated infestations and highly visible; thousands of orange to brown colored trees can be expected to be seen by park users.

The north facing aspect on the south side of the canyon is most heavily affected, with newer infestations manifesting themselves on the north side in scattered pockets of two to five trees. The full extent of the outbreak is currently being mapped from the ground as tree damage becomes more visible and through aerial surveys conducted by the Colorado State Forest Service and USDA Forest Service. Additionally, many landscape, park and street trees within the city limits are exhibiting defoliated upper crowns and brown needles caused by the tussock moth.

Tussock moths overwinter as eggs which typically hatch in late May, early June. As larvae, they migrate to the tops of their host trees and begin feeding on the new needle growth. As they grow in size and number, the tree may be completely stripped of its foliage and ability to feed and water itself. Pupation occurs late July and early August becoming adults that mate, lay eggs and die, completing a one year life cycle. Repeated defoliation can lead to the death of many trees, even over thousands of acres.

Tussock moth hairs found on the caterpillars and cocoons can cause severe allergic reactions in some people who come into direct contact with them, so those who live, work and recreate in affected areas should take caution.

Western spruce budworms overwinter as larvae in silken cocoons and begin feeding on buds and second year needles in late May. Ordinarily only about 3 weeks ahead of tussock moth to maturity, they pupate in June and emerge as adults in July to early August. A recent survey discovered multitudes of adult budworm moths already exist in the canyon.

Tussock moth, and to a lesser extent western spruce budworm, infestations are cyclical and flashy; here today and gone in three years. They typically do not warrant extravagant treatments. However, given that the watershed where the infestation is occurring has multiple owners and resource values, City Forestry, a division of Colorado Springs Parks and Recreation, along with Colorado State Forest Service, Colorado Springs Utilities, the Broadmoor, and others are in the initial stages of planning an aerial spraying treatment for May/June of 2016. The control of the infestation is critical to protecting the live green canopy of the trees, reducing defoliation and death of the forest, protecting water quality and quantity and protecting from long term fire hazards.